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New species of *Graphomya* Robineau-Desvoidy, 1830 (Diptera: Muscidae) from North Australia

Новый вид *Graphomya* Robineau-Desvoidy, 1830 (Diptera: Muscidae) из северной Австралии

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KEY WORDS: *Graphomya allarufa*, Muscidae, Diptera, new species.
КЛЮЧЕВЫЕ СЛОВА: *Graphomya allarufa*, Muscidae, Diptera, новый вид.

ABSTRACT. *Graphomya allarufa* **sp.n.** is described from Australia, Queenslend.

РЕЗЮМЕ. *Graphomya allarufa* **sp.n.** описан из Квинсленда, Австралия.

Introduction

The flies of the genus *Graphomya* are medium to large Muscidae with remarkably large, usually hairy eyes and distinctly striped scutum. The frons is narrow in males and broad in females; arista is long plumose; the notopleuron, meron and katepimeron are setulose; the vein M is curved forward, the vein R4+5 setulose near the radial node at both sides. The genus is distributed mostly in the tropical areas of the Old World, at least 10 species are known from South Asia, but poorly represented in generally arid Australia where 2 species only were recorded: *G. campbelli* Mackerras, 1932 [Pont, 2012], known from North Territory and Queensland and widespread *Graphomya rufitibia* Stein, 1918. However species of *Graphomya* are usually widely distributed [Vikhrev, 2011], so the faunas of the adjacent regions were taken into account, the Oriental fauna of *Graphomya* was considered by Emden [1965], the fauna of New Guinea and Oceania by Vockeroth [1972]. Nevertheless a new and nice species of *Graphomya* described here distinctly differs from all known species.

Material and methods

The holotype and paratype are kept in the Australian National Insect Collection (ANIC), Canberra, Australia.

Geographical coordinates are given in the Decimal Degrees format.

The following generally accepted abbreviations for morphological structures are used: *f1*, *t1*, *f2*, *t2*, *f3*, *t3* = fore-, mid-, hind- femur or tibia respectively; *ac* — acrostichal setae; *dc* — dorsocentral setae; *a*, *p*, *d*, *v* = anterior, posterior, dorsal, ventral seta(e).

Graphomya allarufa Vikhrev **sp.n.**
Figs 1–4

Holotype ♂, [**Australia**] Earl Hill [16.8S 145.7E], N. of Cairns, N ***Qld*** / 8 May 1967 / H.D. Colless. Right hind leg broken, only femur left from right fore leg, right antenna broken.

Paratype, 1♀, [**Australia, *Qld***] 5 miles [8 km] W of Tully [17.93S 145.85E] / 23 Apr.1955 / K.R. Norris.

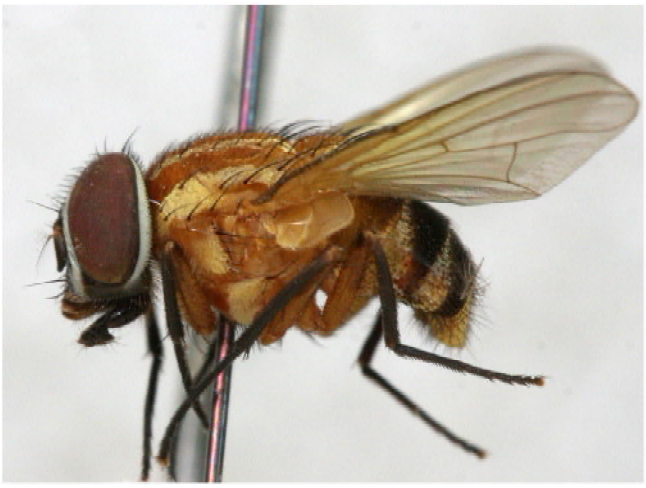
DESCRIPTION. Male (Figs 1–2), body length 5.8 mm.

Head with large eyes covered by whitish hairs, upper anterior facets distinctly enlarged, the narrowest distance between eyes equal to diameter of the anterior ocellus. Fronto-orbital plates narrow; interfrontalia visible only in anterior third; parafacials 1.5x as wide as diameter of anterior ocellus; gena narrow, as wide as antenna. Fronto-orbital plates, parafacials, face and gena brownish, interfrontalia black, occiput brownish-grey dusted. Fronto-orbital plates with 8–9 inclinate setae of various length in anterior half, otherwise bare. Antenna brownish, postpedicel obscurely yellowish at base; arista with longest hairs 3–4x as long as antenna width, apical third of arista bare. Palpi yellow; mentum of proboscis brown, subshining.

Thorax entirely yellowish-red with dainty golden-whitish pollinosity: a pair of evenly narrow submedian vittae present along dorsocentrals and extend on the lateral surface of scutellum; a pair of wider lateral vittae present along postpronotal lobe, notopleuron and supraalar area; golden-whitish pollinosity also present on posterior part of anepisternum and on katepisternum. Thorax evenly covered with sparse groundsetulae, thoracic setae: *ac* 0+1; *dc* 2+4, all strong; postpronotal 2, intraalars 1+2, supraalars 0+2; prealar seta strong; notopleuron with 2 strong setae and sparse setulae; katepisternals 0+2; anepisternum with distinct seta on upper anterior area; meron with 4–6 setulae below posterior spiracle, without stronger seta(e); katepimeron with 2–3 setulae; scutellum bare ventrally. Spiracles yellow. Wings hyaline, veins yellow, halters yellow; calypters whitish. Vein R4+5 with 4–5 setulae near radial node on both sides, setulae extend till almost half distance to *r-m* crossvein; vein M curved forward at apex; wing tip closer to apex of R4+5 than to apex of M1+2.

1

2



3

4

Figs 1–4. *Graphomya allarufa* **sp.n.**: 1–2 — ♂ holotype; 3–4 — ♀ paratype; 1, 3 — lateral view; 2 — posterodorsal view; 4 — dorsal view.
Рис 1–4. *Graphomya allarufa* **sp.n.**: 1–2 — ♂ голотип; 3–4 — ♀ paratype; 1, 3 — сбоку; 2 — сверху сзади; 4 — сверху.

Legs: femora and knees yellow yellow; tibiae and tarsi black. *t1* without setae except preapicals. *f2* in basal third with 4–5 fine *v* setae and with 2 *pd* at apex. *t2* with 2 *p-pd* setae: before middle and in apical third and with 1 *p-pv* seta below middle. *f3* with a row of *av* setae (about as long as femur width) and 2–3 *pv* before middle. *t3* with 1 submedian *av* and 1 submedian *ad* setae.

Abdomen without distinct marks or spots. Tergites 1+2 and 3 dirty-yellow, tergite 4 dark, with traces of yellowish pollinosity laterally, tergite 5 dark with distinct yellowish pollinosity and indistinct mediam vita. I have not dissected abdomen of the single available male specimen, because in *Graphomya* the abdominal pattern is usually more important for diagnostic than the male terminalia.

Female (Figs 3–4), differs from male as follows: body length 6.4 mm. Head with eyes dichoptic and bare, upper anterior facets of eyes not enlarged. Frons gradually widened anteriorly from 0.22 head width at vertex to 0.38 at lunula. Interfrontalia black with rather indistinct, narrow, grey dusted frontal triangle. Fronto-orbital plates and parafacials about 2x wider than in male, densely grey dusted. Gena also wider and grey dusted, but median third of gena undusted brown as in male. Fronto-orbital plates with about 10 pairs of inclinate setae and with 2 pairs of proclinate setae posteriorly. Abdomen with only tergite 1+2 translucent yellow; tergites 3 and 4 black with yellow dusting laterally; tergite 5 densely yellow dusted.

DIAGNOSIS. Both sexes of *Graphomya allarufa* **sp.n.** are unmistakable from all known species of *Graphomya* due to entirely yellowish-red thorax with dainty golden-whitish pollinosity which forms narrow submedian vittae along dorsocentrals and wider lateral vittae along postpronotal lobe, notopleuron and supraalar area.

ETYMOLOGY. The name *allarufa* is a noun in apposition being a combination of 2 words: the given name of my red-haired wife *Alla* and a Latin adjective *rufa* which means “red”, in feminine gender.

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